## IN THE UNITED STATES DISTRICT COURT FOR THE EASTERN DISTRICT OF TEXAS MARSHALL DIVISION

CORELOGIC INFORMATION	§	
SOLUTIONS, INC.	§	
	§	Case No. 2:10-CV-132-RSP
v.	§	Case No. 2:10-C v-132-RSP
	§	
FISERV, INC., et al.	§	

# CLAIM CONSTRUCTION MEMORANDUM AND ORDER

On March 7, 2012, the Court held a hearing to determine the proper construction of the disputed claim terms in U.S. Patent No. 5,361,201. After considering the arguments made by the parties at the hearing and in the parties' claim construction briefing (Dkt. Nos. 213, 220, and 225), the Court issues this Claim Construction Memorandum and Order.

#### APPLICABLE LAW

#### A. Claim Construction

"It is a 'bedrock principle' of patent law that 'the claims of a patent define the invention to which the patentee is entitled the right to exclude." *Phillips v. AWH Corp.*, 415 F.3d 1303, 1312 (Fed. Cir. 2005) (en banc) (quoting *Innova/Pure Water Inc. v. Safari Water Filtration Sys., Inc.*, 381 F.3d 1111, 1115 (Fed. Cir. 2004)). To determine the meaning of the claims, courts start by considering the intrinsic evidence. *See id.* at 1313. *C.R. Bard, Inc. v. U.S. Surgical Corp.*, 388 F.3d 858, 861 (Fed. Cir. 2004); *Bell Atl. Network Servs., Inc. v. Covad Communications Group, Inc.*, 262 F.3d 1258, 1267 (Fed. Cir. 2001). The intrinsic evidence includes the claims themselves, the specification, and the prosecution history. *See Phillips*, 415 F.3d at 1314; *C.R. Bard, Inc.*, 388 F.3d at 861. Courts give claim terms their ordinary and accustomed meaning as understood by one of ordinary skill in the art at the time of the invention in the context of the

entire patent. *Phillips*, 415 F.3d at 1312–13; *Alloc, Inc. v. Int'l Trade Comm'n*, 342 F.3d 1361, 1368 (Fed. Cir. 2003).

The claims themselves provide substantial guidance in determining the meaning of particular claim terms. *Phillips*, 415 F.3d at 1314. First, a term's context in the asserted claim can be very instructive. *Id.* Other asserted or unasserted claims can aid in determining the claim's meaning because claim terms are typically used consistently throughout the patent. *Id.* Differences among the claim terms can also assist in understanding a term's meaning. *Id.* For example, when a dependent claim adds a limitation to an independent claim, it is presumed that the independent claim does not include the limitation. *Id.* at 1314–15.

"[C]laims 'must be read in view of the specification, of which they are a part." *Id.* (quoting *Markman v. Westview Instruments, Inc.*, 52 F.3d 967, 979 (Fed. Cir. 1995) (en banc)). "[T]he specification 'is always highly relevant to the claim construction analysis. Usually, it is dispositive; it is the single best guide to the meaning of a disputed term." *Id.* (quoting *Vitronics Corp. v. Conceptronic, Inc.*, 90 F.3d 1576, 1582 (Fed. Cir. 1996)); *Teleflex, Inc. v. Ficosa N. Am. Corp.*, 299 F.3d 1313, 1325 (Fed. Cir. 2002). This is true because a patentee may define his own terms, give a claim term a different meaning than the term would otherwise possess, or disclaim or disavow the claim scope. *Phillips*, 415 F.3d at 1316. In these situations, the inventor's lexicography governs. *Id.* The specification may also resolve the meaning of ambiguous claim terms "where the ordinary and accustomed meaning of the words used in the claims lack sufficient clarity to permit the scope of the claim to be ascertained from the words alone." *Teleflex, Inc.*, 299 F.3d at 1325. But, "[a]lthough the specification may aid the court in interpreting the meaning of disputed claim language, particular embodiments and examples appearing in the specification will not generally be read into the claims." *Comark* 

Communications, Inc. v. Harris Corp., 156 F.3d 1182, 1187 (Fed. Cir. 1998) (quoting Constant v. Advanced Micro-Devices, Inc., 848 F.2d 1560, 1571 (Fed. Cir. 1988)); see also Phillips, 415 F.3d at 1323. The prosecution history is another tool to supply the proper context for claim construction because a patent applicant may also define a term in prosecuting the patent. Home Diagnostics, Inc., v. Lifescan, Inc., 381 F.3d 1352, 1356 (Fed. Cir. 2004) ("As in the case of the specification, a patent applicant may define a term in prosecuting a patent.").

Although extrinsic evidence can be useful, it is "less significant than the intrinsic record in determining the legally operative meaning of claim language." *Phillips*, 415 F.3d at 1317 (quoting *C.R. Bard, Inc.*, 388 F.3d at 862). Technical dictionaries and treatises may help a court understand the underlying technology and the manner in which one skilled in the art might use claim terms, but technical dictionaries and treatises may provide definitions that are too broad or may not be indicative of how the term is used in the patent. *Id.* at 1318. Similarly, expert testimony may aid a court in understanding the underlying technology and determining the particular meaning of a term in the pertinent field, but an expert's conclusory, unsupported assertions as to a term's definition is entirely unhelpful to a court. *Id.* Generally, extrinsic evidence is "less reliable than the patent and its prosecution history in determining how to read claim terms." *Id.* 

#### **B.** Means-Plus-Function Limitations

The asserted claims also contain means-plus-function limitations that require construction. Where a claim limitation is expressed in "means plus function" language and does not recite definite structure in support of its function, the limitation is subject to 35 U.S.C. § 112, ¶ 6. *Braun Med., Inc. v. Abbott Labs.*, 124 F.3d 1419, 1424 (Fed. Cir. 1997). In relevant part, 35 U.S.C. § 112, ¶ 6 mandates that "such a claim limitation 'be construed to cover the corresponding structure . . . described in the specification and equivalents thereof." *Id.* (citing 35

U.S.C. § 112,  $\P$  6). Accordingly, when faced with means-plus-function limitations, courts "must turn to the written description of the patent to find the structure that corresponds to the means recited in the [limitations]." *Id*.

Construing a means-plus-function limitation involves multiple steps. "The first step in construing [a means-plus-function] limitation is a determination of the function of the means-plus-function limitation." *Medtronic, Inc. v. Advanced Cardiovascular Sys., Inc.*, 248 F.3d 1303, 1311 (Fed. Cir. 2001). Once a court has determined the limitation's function, "the next step is to determine the corresponding structure disclosed in the specification and equivalents thereof." *Id.* A "structure disclosed in the specification is 'corresponding' structure only if the specification or prosecution history clearly links or associates that structure to the function recited in the claim." *Id.* Moreover, the focus of the "corresponding structure" inquiry is not merely whether a structure is capable of performing the recited function, but rather whether the corresponding structure is "clearly linked or associated with the [recited] function." *Id.* 

### **DISCUSSION**

## A. Disputed Claim Terms 1-3 and 8-10

Claim Term 1: "training data"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"training data" (claims 1, 3, 7, 9, 12, 14, 15, and 19)	"data which is available regarding real estate properties"	"records of historical data grouped as inputs and corresponding outputs that enable a statistical model to be fully developed"

CoreLogic argues that the scope of this term is readily understood in the context of the patent, and should not be limited to one exemplary type of record disclosed in the specification. Dkt. No. 213 at 6. For example, the background of the invention describes how "[i]t is desirable . . . to have an automated system that uses available information regarding real estate

properties to provide accurate estimates of value." Dkt. No. 213 at 6 (quoting '201 Pat. at 2:17-20). CoreLogic cites other portions of the specification consistent with its construction: "models are trained using training data describing a number of individual real estate properties, characteristics, and prices, as well as area characteristics . . . ." '201 Pat. 5:47-49. CoreLogic notes that the specification gives nearly 50 examples of training data, such as the number of bedrooms, number of fireplaces, type of parking, and square footage of the property. Dkt. No. 213 at 6-7. Defendants argue that their construction is more appropriate because it gives meaning to the word "training." Defendants' construction relies upon the description of the training process in the specification and inventor deposition testimony to support their construction. Dkt. No. 220 at 18-19.

The Court finds that CoreLogic's construction is better supported by the specification, is a better fit in the context of the invention, and is likely to be more readily understood by the jury because it defines "training data" in terms of the content of the data as opposed defining the data by its function. Accordingly, the Court finds that the term training data means "data which is available regarding real estate properties."

Claim Term 2: "predictive model"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"predictive model" (claims 1, 3, 7, 9, 14, and 15)	No construction necessary, but if construed, construe as: "model that generates estimates using a predictive technique"	"statistical model that automatically learns relationships among predictor variables based exclusively on training data and that uses the learned relationships to estimate values based on new input values"

CoreLogic contends that the term "predictive model" does not need construction, and that Defendants' construction improperly limits the term to only cover neural networks, which is only one embodiment disclosed in the specification. Defendants agree that the term covers more than

just neural networks, but that the term should exclude regression models, which is what Defendants claim their construction accomplishes. Defendants argue that their construction is proper in light of: 1) the claim language surrounding the term, 2) the disparagement of regression models in the specification, and 3) the portions of the prosecution history that suggest the examiner understood the claims to only cover neural networks, and 4) the fact that regression models cannot be trained or said to learn. The Court addresses each of these arguments.

#### 1. Surrounding Claim Language

Defendants' argue that "the claim wording suggests a predictive model that is actively, automatically developed based on learned relationships," a concept which they contend is better captured by their construction. Dkt. No. 220 at 11. Defendants observe that the method claims require "developing a predictive model from the training data," and that the corresponding system claims require "a model development component, coupled to the predictive model, for training the predictive model from the training data." *Id.* Defendants cite additional evidence from the specification and the prosecution history showing "the dynamic, automated nature of the 'predictive model." *Id.* at 12-13.

The Court is not persuaded that it is necessary to construe "predictive model" to include limitations from the surrounding claim language. To the extent the terms "developing" and "development" limit the types of predictive models that fall within the scope of the claims, the limitation is already present in the claims, and Defendants have not justified reiterating that limitation into the construction of other terms within the same claims.

## 2. Disavowal of Regression Models by Disparagement

Defendants argue that "the patent disavows the 'traditional statistical techniques, such as multiple linear regression and logistic regression,' disparaging them as 'deficient.'" Dkt. No.

220 at 13. Defendants cite the following passages from background of the invention as examples of the patent disparaging regression models or techniques:

Traditional statistical techniques, such as multiple linear regression and logistic regression, have been tried, but such techniques typically suffer from a number of deficiencies. One deficiency is the inability of *traditional regression models* to capture complex behavior in predictor variables resulting from nonlinearities and interactions among predictor variables. In addition, *traditional regression models* do not adapt well to changing trends in the data, so that automated model redevelopment is difficult to implement. '201 Pat. at 1:56-66.

\* \* \*

A model developed using all homes in one square city block might theoretically be an effective predictor for that particular neighborhood, but it may not be possible to develop such a model with sufficient stability and reliability, due to the relatively small sample size. On the other hand, a model developed using all homes sold in the United States in the past month might have a sufficiently large sample size, but might be unable to capture local, neighborhood characteristics to provide an accurate appraisal. Thus, a significant deficiency of *traditional regression modeling* techniques when applied to real estate appraisals is the inability to successfully model neighborhood characteristics while including a sufficiently large sample size to develop a robust, stable statistical model. '201 Pat. at 2:2-16.

CoreLogic argues that the specification criticizes the traditional application of regression models, but does not disparage regression models generally. Dkt. No. 225 at 4-5. According to CoreLogic, the cited portions of the background of the invention describe the inability of prior art regression models to handle problems with sample sizes, which is a problem remedied by the automated techniques disclosed in the patent. *Id.* Moreover, CoreLogic notes that the patent explicitly teaches using a regression model as the predictive model: "Although neural network models are used in the embodiment illustrated herein, any type of predictive modeling technique may be used, such as regression modeling." *Id.* at 5 (quoting '201 Pat. at 6:13-16).

A disavowal of claim scope based upon disparagement in the specification "requires 'expressions of manifest exclusion or restriction, representing a clear disavowal of claim scope." *Epistar Corp. v. ITC*, 566 F.3d 1321, 1335 (Fed. Cir. 2009) (quoting *Teleflex Inc. v. Ficosa N. Am. Corp.*, 299 F.3d 1313, 1325 (Fed. Cir. 2002)). "A patentee's discussion of the shortcomings of certain techniques is not a disavowal of the use of those techniques in a manner consistent with the claimed invention." *Epistar*, 566 F.3d at 1335. The Court finds that the critical language here does not rise to the level of a clear disavowal of regression models generally. The critical language in the specification is directed to "*traditional* regression models," and this distinction from regression models in general was made repeatedly. Moreover, the specification explicitly teaches using "regression modeling" for the predictive modeling. Because the specification criticizes "traditional regression models" and simultaneously teaches using "regression modeling," the patentee did not manifestly exclude or restrict all regression models.

## 3. Prosecution History

Defendants contend that the prosecution history requires that the term be construed to exclude regression models. Dkt. No. 220 at 14-15. First, the inventors allegedly distinguished their invention from the prior art by arguing that "a predictive model is employed to learn relationships among various elements of property data' and does so with a 'minimum of human effort." *Id.* at 14. Furthermore, the inventors allegedly responded to a written description rejection by relying on "technical articles and text describing neural networks that the inventors incorporated by reference into the patent specification." *Id.* Finally, Defendants note the patent examiner's statement in the notice of allowance that "the claimed predictive model 'is structurally supported and defined in applicants' specification as a neural network," and claim that this statement by the examiner establishes that the predictive model is limited to covering neural networks. *Id.* at 14-15.

CoreLogic contends that nothing in the prosecution history equates predictive models with neural networks, and that there is no clear and unmistakable disavowal of claim scope. Dkt. No. 225 at 5. Moreover, CoreLogic argues that Defendants have misrepresented the nature of written description rejection. *Id.* CoreLogic explains that inventors incorporated the neural network material in order overcome a written description rejection to the "neural network" claims, and not to the broader "predictive model" claims. *Id.* 

The Court finds that Defendants have not shown there was a clear and unmistakable disavowal of claim scope. In distinguishing the prior art, the inventors did not limit the predictive model to neural networks. *See* Dkt. No. 220-6 at 10 (distinguishing prior art by noting that one claim uses a predictive model, and another claim uses a neural network as the predictive model). Moreover, the response to the written description objection does not limit the claims to cover only neural network embodiments. A review of the prosecution history reveals that the patent examiner was concerned that there was no support for neural networks in the specification, and not predictive models as claimed by Defendants in their brief.

#### 4. Training Methods for Regression Models

Defendants argued at the *Markman* hearing that regression models must be excluded because they do not learn and cannot be trained, which is inconsistent with the patent's description of predictive models. *See* Tr. 12:5-15, 21:6-20. CoreLogic responded by pointing to a teaching in the patent that "[t]raining methods for regression models are well known in the art." Tr. 31:2-25 (quoting '201 Pat. at 10:42-43). Given that the patent claims that training methods for regression models exist, and Defendants only offer attorney argument in response, the Court declines the invitation to exclude regression models from the term predictive model.

For all these reasons, the Court finds that the term "predictive model" should be given its plain and ordinary meaning. Moreover, the Court finds that the plain and ordinary meaning of the term is not limited to a neural network, and does not exclude a regression model.

Claim Term 3: "error model"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"error model" (claims 1, 3, 10, 12, 17, 18, and 19)	"model that estimates error in the predicted sales price of the subject property generated by the predictive model"	"model that estimates error in an output value generated by the predictive model"

The only difference between the parties' proposed constructions is whether the error estimation relates to a predicted sales price or an output value in general. CoreLogic explains in its brief why it believes that its construction would be more readily understood by the jury, and is a better fit in the context of the claims. Dkt. No. 213 at 10-12. Defendants' brief does not offer any reasons to adopt their construction over CoreLogic's. Dkt. No. 220 at 19. Because the Court is persuaded that CoreLogic's construction is likely to be more readily understood by the jury and is adequately supported by the evidence cited by CoreLogic, the Court finds that the term means a "model that estimates error in the predicted sales price of the subject property generated by the predictive model."

Claim Term 8: "computer-implemented process"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"computer-implemented process" (claims 1-3, 5, 9-12, and 14)	No construction necessary. Ordinary meaning.	"a process carried out by a general purpose computer"

CoreLogic argues that no construction is necessary because 1) the term only appears in the preamble and the body of the claim sets out the complete invention, and 2) the term has a plain and ordinary meaning that would be understood by the jury. Dkt. No. 213 at 12-13; Dkt.

No. 225 at 6-7. CoreLogic argues Defendants' construction is improper because the process can be performed by a special purpose computer, and that the phrase "computer-implemented" does not necessarily exclude any human interaction in the process. Dkt. No. 225 at 6-7. Moreover, CoreLogic notes that figure 2 of the patent depicts a user interface, which suggests that at least some human involvement in the claimed appraisal process is proper. Tr. 91:20-92:13. Defendants argue that construction is necessary because "the patent is directed to 'an automated real estate appraisal system . . . ,"" and the patent disparages manual specification or adjustment. Dkt. No. 220 at 17-18.

The Court finds that the term should be given its plain and ordinary meaning because the term has a meaning that will be understood by the jury. Although a computer is required to practice the invention, the Court is not persuaded that any human interaction (such as by entering data associated with a real estate property into the user interface) is excluded. With respect to requiring a "general purpose computer," Defendants conceded at the *Markman* hearing that simply "a computer" is required. Tr. 99:4-14. Therefore, the Court finds that the plain and ordinary meaning of the term is not limited to a general purpose computer, nor does it exclude human interaction or input.

Claim Term 9: "developing/development"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"developing/development" (claims 1, 3, 5, 10, 12, and 14)	No construction necessary. Ordinary meaning.	"building or converting to useful form using the computer- implemented process"

Defendants argue in a conclusory fashion that their proposed construction is consistent with the positions Defendants have taken on other disputed claim terms, and that the term must mean that "the computer-implemented process builds the predictive model." Dkt. No. 220 at 19.

CoreLogic argues that the term has a plain and ordinary meaning that should control, and that Defendants have not explained how "building or converting" is more understandable than the plain and ordinary meaning of the word "developing." Dkt. No. 213 at 13-14. CoreLogic argues that the computer-implemented nature of the invention is already captured in the relevant claims, and that it is unnecessary to reiterate that limitation here. *Id*.

The Court agrees with CoreLogic that it is unclear how "building or converting" will be more easily understood by the jury than the plain and ordinary meaning of the word "developing," and that it is unnecessary to reiterate the computer-implemented nature of the claims. Defendants do not explain how the plain and ordinary meaning of their proposed construction varies from the concept encompassed by the word "developing." Accordingly, the Court finds that the term should be given its plain and ordinary meaning.

Claim Term 10: "model development component"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"model development	This phrase is not governed by 35 U.S.C. § 112 ¶ 6.	Governed by 35 U.S.C. § 112 ¶ 6
componentfor training the [predictive/error]	No construction necessary.	Function: training the [predictive/error] model
model" (claims 15 and 17)		<u>Corresponding Structure</u> : No algorithm or other structure is disclosed rendering the term indefinite.

Defendants argue that a "component" is too generic to convey structure, and should be treated as a mean-plus-function limitation. Dkt. No. 220 at 26-27. Defendants argue that figure 9 discloses a model development component, but does not identify structure or an algorithm. *Id.* CoreLogic argues that because the term does not use the word "means" there is no presumption that the term is a not mean-plus-function limitation. Dkt. No 213 at 29. CoreLogic notes that "over a third of the written description . . . is dedicated to describing the structure and function of

the 'model development component,' and [the specification] includes references to multiple diagrams." *Id.* at 30. At the *Markman* hearing, CoreLogic argued that in light of the significant disclosure, that a person of ordinary skill would understand that the model development component refers to a part of a software structure. Tr. 105:5-106:8. CoreLogic explained that figure 9 is not a mere black box representation of the module, but is a figure that illustrates the logical structure of a computer program and describes the inputs to the component as well as illustrates the relationship between the various components of the software. Tr. 107:6-108:9.

When a claim term does not use the word "means," a rebuttable presumption arises that the term is not a means-plus-function limitation governed by 35 U.S.C. § 112,  $\P$  6. CCS Fitness, Inc. v. Brunswick Corp., 288 F.3d. 1359, 1369 (Fed. Cir. 2002). To rebut the presumption, a party must show "that the claim term fails to recite sufficiently definite structure or else recites a function without reciting sufficient structure for performing that function." Id. A claim term recites sufficient structure if it has an understood meaning in the art. Id. It is proper to consult the intrinsic record, including the written description, to determine whether the presumption that a claim lacking the term means recites sufficiently definite structure. Inventio AG v. Thyssenkrupp Elevator Americas Corp., 649 F.3d 1350, 1357 (Fed. Cir. 2011). The issue is whether a skilled artisan, after reading the patent, would conclude that the limitation is so devoid of structure that the drafter constructively engaged in means-plus-function claiming. Id.

The Court finds that Defendants have not rebutted the presumption that 35 U.S.C. § 112, ¶ 6 does not apply to this claim term, and is persuaded that a person of ordinary skill in the art would find that the term refers to a software structure that handles training the predictive model. The written description of the patent depicts the model development component as part of the system architecture in Figure 9. The figure and written description at column 6, lines 3-22, show

how the model development component is connected to the other elements, including training data input and model outputs. The model development component is then described in greater detail in columns 6 and 7, and throughout the specification. From the written description, a person skilled in the art would understand that the model development component is a computer program operating on a computer system such as shown in Figure 1.

Like the "modernizing device" and "computing unit" in *Inventio*, the model development component is not so structurally devoid it should be rewritten in means-plus-function format. The written description indicates that a person skilled in the art would understand the model development component to connote sufficiently definite structure. Therefore, the Court finds that the term is not governed by 35 U.S.C. § 112, ¶ 6, and that the term should be given its plain and ordinary meaning.

### B. Agreed Means-Plus-Function Claim Terms 4-7

The parties agree that claim terms 4, 5, 6, and 7 are claim terms governed by 35 U.S.C. § 112, ¶ 6. The parties also agree on the function of each of the terms. The only dispute is whether the specification discloses a sufficient corresponding structure for each term. CoreLogic argues that specification discloses structure for each of the terms in the form of flowcharts, algorithms described in prose, as well as the complete source code for an embodiment of the invention, which was attached as an appendix to the specification. Tr. 116:22-117:7. Moreover, CoreLogic has submitted two affidavits by Dr. Jost (a named inventor) that identify the portions of the source code appendix that support the various means-plus-function limitations. *See* Dkt. Nos. 225-3, 228-1. CoreLogic observes that Defendants rely solely upon attorney argument to support their position that the specification does not adequately disclose structure for each of the means-plus-function limitations. Tr. 117:16-118:2.

Defendants contend that the specification does not provide adequate disclosure of structures corresponding to each of the mean-plus-function limitations. With respect to the source code, Defendants argue that it difficult to identify the portions of the source code relevant to each limitation, and suggest that the patent's draftsman should have been more explicit. Tr. 125:4-127:4. Defendants admit that they have not attempted to execute the source code, but claim that multiple persons who have degrees in computer science have examined the source code and cannot figure it out. Tr. 128:10-15.

mean-plus-function limitations implemented by computer software, corresponding structure described in the patent specification must include an algorithm for performing the function. WMS Gaming Inc. v. Int'l Game Tech., 184 F.3d 1339, 1349 (Fed. Cir. 1999). The corresponding structure is not a general purpose computer but rather the special purpose computer programmed to perform the disclosed algorithm. Aristocrat Techs. Austl. Pty Ltd. v. Int'l Game Tech., 521 F.3d 1328, 1333 (Fed. Cir. 2008). The Court is not persuaded that the terms at issue are indefinite because the specification fails to adequately disclose the corresponding structure for each of the means-plus-function limitations. As Defendants' note, it is unusual for the entire source code of an embodiment to be disclosed in a patent application. Defendants have not offered any evidence that the source code is inoperative or does not practice the asserted claims. The length of the source code – a few hundred pages – does not appear to be too voluminous to be useful to a person of ordinary skill in the art. Furthermore, CoreLogic offers the testimony of Dr. Jost to identify the source code in the appendix that is the corresponding structure for each of the means-plus-function limitations. Defendants suggest that Dr. Jost may not be a person of ordinary skill in the art, but do not offer any evidence as to what the applicable standard should be, or what that person would understand from the patent's

disclosure. Defendants do not offer competing evidence from any witness, lay or expert, to contradict Dr. Jost's testimony.

Therefore, with respect to means-plus-function claim terms 4-7, the Court finds that the specification adequately discloses a corresponding structure for each of the means-plus-function limitations, and adopts the corresponding structure proposed by CoreLogic.

Claim Term 4: "training data input means"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"training data input means" (claims 15, 17, and 19)	Agreed Function: inputs training data to the system  Corresponding Structure: Computer or CPU programmed to carry out an algorithm that accepts user supplied property data via input device to computer or CPU, or accesses data storage containing data describing real estate properties, as well as regional data, and all engineering equivalents thereof, or source code disclosed at col. 17, ln. 1 - col. 277, ln. 31 and all engineering equivalents thereof. Data storage is conventional	Corresponding Structure: No algorithm or other structure is disclosed rendering the term indefinite.
	RAM, ROM and disk storage devices and all engineering equivalents thereof.	

The Court finds that the term is governed by 35 U.S.C. § 112, ¶ 6.

<u>Function</u>: The parties have stipulated that the function of the training data input means is to input training data to the system.

Corresponding Structure: The Court finds that the corresponding structure is a computer or CPU programmed to 1) carry out an algorithm: a) that accepts user supplied property data via input device to the computer or CPU; b) that is described by the source code at col. 211, line "data out.train;" c) that is described by the source code at col. 239, line "If epflag='trn' output out.train;" or d) that is described by the source code at col. 239, line "proc reg data = out.train;"

or 2) access data storage containing data describing real estate properties, as well as regional data. Data storage is conventional RAM, ROM and disk storage devices.

Claim Term 5: "training data aggregation means"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"training data aggregation	Agreed Function: aggregates training data	
means" (claim 15)	Corresponding Structure: Computer or CPU programmed to carry out an algorithm that aggregates individual property data in the training data set into area characteristics in a flexible manner, using the smallest geographic areas containing sufficient data to produce reliable models (e.g. FIG. 18) and all engineering equivalents thereof, or source code disclosed at col. 17, ln. 1 – col. 277, ln. 31 and all engineering equivalents thereof.	Corresponding Structure: No algorithm or other structure is disclosed rendering the term indefinite.

The Court finds that the term is governed by 35 U.S.C. § 112, ¶ 6.

<u>Function</u>: The parties have stipulated that the function of the training data aggregation means is to aggregate training data.

Corresponding Structure: The Court finds that the corresponding structure is a computer or CPU programmed to carry out an algorithm: a) that aggregates individual property data in the training data set into area characteristics in a flexible manner, using the smallest geographic areas containing sufficient data to product reliable results (Fig. 18); or b) that is described by the source code starting at col. 211, line "pred\_sp2 = pred\_sp \* pred\_sp" and ending at col. 239, line "obsno=\_n\_."

Claim Term 6: "area data input means"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"area data input means"	Agreed Function: inputs area data to the system	
(claims 15, 17, and 19)	Corresponding Structure: Computer or CPU programmed to carry out an algorithm that accepts user supplied area data via input device to computer or CPU, or accesses data storage containing data describing regional data, and all engineering equivalents thereof, or source code disclosed at col. 17, ln. 1 – col. 277, ln. 31 and all engineering equivalents thereof. Data storage is conventional RAM, ROM and disk storage devices and all engineering equivalents thereof.	Corresponding Structure: No algorithm or other structure is disclosed rendering the term indefinite.

The Court finds that the term is governed by 35 U.S.C. § 112, ¶ 6.

<u>Function</u>: The parties have stipulated that function of the area data input means is to input area data to the system.

Corresponding Structure: The Court finds that the corresponding structure is a computer or CPU programmed to 1) carry out an algorithm: a) that accepts user supplied area data via input device to the computer or CPU; or b) that is described by the source code at col. 211, line "Set in.epmaster;" or 2) access data storage containing data describing regional data. Data storage is conventional RAM, ROM, and disk storage devices.

Claim Term 7: "individual property data input means"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"individual	Agreed Function: inputs individual property data to the system	
property data input means" (claims 15, 17, and 19)	Corresponding Structure: Computer or CPU programmed to carry out an algorithm that obtains property data entered by the user on a data entry form in a conventional window-based interface such as those shown in FIGS. 2 and 3, or by batch input using tape or disc storage devices and all engineering equivalents thereof, or source code disclosed at col. 17, ln. 1 – col. 277, ln. 31 and all engineering equivalents thereof.	Corresponding Structure: No algorithm or other structure is disclosed rendering the term indefinite.

The Court finds that the term is governed by 35 U.S.C. § 112, ¶ 6.

<u>Function</u>: The parties have stipulated that the function of the individual property data input means is to input individual property data to the system.

Corresponding Structure: The Court finds that the corresponding structure is a computer or CPU programmed to carry out an algorithm: a) that obtains property data entered by the user on a data entry form in a conventions window-based interface, such as those shown in Figs. 2 and 3; b) that obtains property data by batch input using tape or disc storage devices; c) that is described by the source code starting at col. 241, line "proc score" and ending at col. 243, line "run;" d) that is described by the source code at col. 27; or e) that is described by the source code at cols. 193-195.

# C. Disputed Means-Plus-Function Terms 11-13

Claim Term 11: "training data input means is coupled to the error"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"training data input means is coupled to the error model" (claim 17)	No construction necessary. Construction proposed by the parties for "training data input means."	Governed by 35 U.S.C. § 112 ¶ 6  Function: inputs training data to the error model  Corresponding Structure: No algorithm or
		other structure is disclosed rendering the term indefinite.

The Court finds that this term refers to the "training data input means" first introduced in claim 15 and therefore requires no further construction.

Claim Term 12: "the individual property data input means...sends the individual property data to the error model"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"the individual property data input meanssends the individual property data to the error model" (claim 17)	No construction necessary. Construction proposed by the parties for "individual property data input means."	Governed by 35 U.S.C. § 112 ¶ 6 <u>Function</u> : sends individual property data to the error model <u>Corresponding Structure</u> : No algorithm or other structure is disclosed rendering the term indefinite.

The Court finds that this term refers to the "individual property data input means" first introduced in claim 15 and therefore requires no further construction.

Claim Term 13: "area data input means...sends the area data to the error model"

Claim Term	CoreLogic's Proposal	Defendants' Proposal
"area data input meanssends the area data to the error model" (claim 17)	No construction necessary. Construction proposed by the parties for "area data input means."	Governed by 35 U.S.C. § 112 ¶ 6  Function: sends area data to the error model  Corresponding Structure: No algorithm or other structure is disclosed rendering the term indefinite.

The Court finds that this term refers to the "area data input means" first introduced in claim 15 and therefore requires no further construction.

#### **CONCLUSION**

The Court adopts the above constructions. The parties are ordered that they may not refer, directly or indirectly, to each other's claim construction positions in the presence of the jury. Likewise, the parties are ordered to refrain from mentioning any portion of this opinion, other than the actual definitions adopted by the court, in the presence of the jury. Any reference to claim construction proceedings is limited to informing the jury of the constructions adopted by the Court.

SIGNED this 21st day of September, 2012.

UNITED STATES MAGISTRATE JUDGE